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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/678,799	10/03/2003	Tobias Gerlach	KOA 0242 PUS (R 1415)	3893
22045	7590	12/21/2005	EXAMINER	
BROOKS KUSHMAN P.C. 1000 TOWN CENTER TWENTY-SECOND FLOOR SOUTHFIELD, MI 48075			WEST, JEFFREY R	
			ART UNIT	PAPER NUMBER
			2857	

DATE MAILED: 12/21/2005

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10/678799

APPLICATION NO./ CONTROL NO.	FILING DATE	FIRST NAMED INVENTOR / PATENT IN REEXAMINATION	ATTORNEY DOCKET NO.
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EXAMINER
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ART UNIT	PAPER
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Commissioner for Patents

**Response to Reply Brief**

1. The reply brief filed June 02, 2005, has been entered and considered. The application has been forwarded to the Board of Patent Appeals and Interferences for decision on the appeal.

2. The following arguments presented in the reply brief are also noted.

Appellant argues that "A residual interference component present within the resultant superimposed signal output from the summing amplifier 3 implies that the interference components of the current signal and the voltage signal are not the same. The interference component of the voltage signal may be larger than the interference component of the current signal in which case 'overcompensation' takes place (col. 3, lines 43-40). Similarly, the interference component of the voltage signal may be smaller than the interference component of the current signal in which case 'undercompensation' takes place (col. 3, lines 43-50). The polarity of the residual interference component contained in the resultant superimposed signal is used by a polarity comparator 4 to control the 'K' gain of the amplifier 22 such that the 'result is a closed loop control which at all times maintains a state of balance within narrow limits between overcompensation and undercompensation' (col. 4, lines 26-38)."

The Examiner first asserts that Appellant stated, in the Appeal Brief filed March 23, 2005, that "Falk discloses that the voltage signal ( $u_B$ ) containing the interference

is essentially obtained from a monitored current ( $i$ ) (see col. 3, lines 1-21 of Falk); and the voltage signal ( $u_B$ ) is subtracted from a current signal ( $u_i$ ) that is the derivative of the monitored current ( $i$ ) (see col. 3, lines 22-44 of Falk)” (Appeal Brief, page 10, lines 25-28) and “modifying Matsumoto to include means for removing interference from the armature current signal using a voltage signal that contains the interference as taught by Falk does not result in the claimed invention because such a modification would essentially include using a voltage signal that is based on the armature current signal” (Appeal Brief, page 11, lines 9-13), thereby admitting that the voltage signal of Falk does contain ‘the interference’.

Further, turning to the invention of Falk, while Appellant has indicated that in certain instances an overcompensation or undercompensation does occur in which the interferences of the current and voltage signal vary slightly, this condition is undesired and in a preferred embodiment used to determine the useful current signal, which is the embodiment of Falk relied upon in the rejection, the control loop is controlled so that no overcompensation or undercompensation occurs. The preferred embodiment in which the useful current signal is determined by removing interference from the current signal through subtraction of a voltage signal containing the interference is described, for example, in column 2, lines 18-22:

“A signal corresponding to this interference voltage is used to compensate the disturbing component of the current signal brought about by this same interference voltage, this being achieved by means of a control loop acting through the polarity comparator mentioned.”

Art Unit: 2857

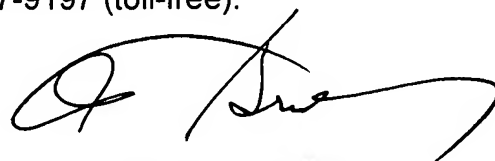
For this reason, the Examiner maintains that the invention of Falk does teach sensing a current signal containing a useful part and interference, obtaining a voltage signal that contains the interference, and subtracting the voltage signal from the current signal to result in the current signal void of interference.

3. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jeffrey R. West whose telephone number is (571)272-2226. The examiner can normally be reached on Monday through Friday, 8:00-4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Marc S. Hoff can be reached on (571)272-2216. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

jrw  
December 6, 2005



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